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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|----------------------|---------------------|------------------|
| 10/588,157 | 10/30/2006 | Lars-Olof Ohnell | 66352-047 | 9208 |
| 25769 7590 03/30/2010 DYKEMA GOSSETT PLLC FRANKLIN SQUARE, THIRD FLOOR WEST 1300 I STREET, NW WASHINGTON, DC 20005 | | | | |
| EXAMINER LAWSON, MATTHEW JAMES | | | | |
| ART UNIT | | PAPER NUMBER | | |
| 3775 | | | | |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/588,157

Applicant(s)

OHRNELL ET AL.

Examiner

MATTHEW LAWSON

Art Unit

3775

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 March 2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1 and 4-23 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1, 4-23 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/22)
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date: _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____
- Paper No(s)/Mail Date: _____

DETAILED ACTION

Response to Arguments

Applicant's request for reconsideration of the finality of the rejection of the last Office action is persuasive and, therefore, the finality of that action is withdrawn.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 4-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Branemark (EP 0599794 A2) in view of Wolf (US 6,629,977).

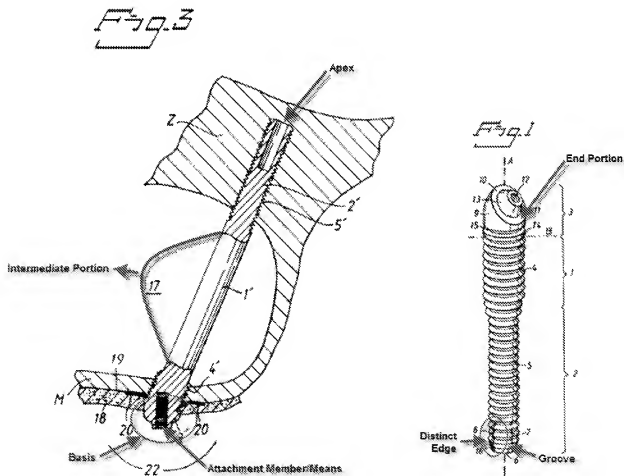
Branemark discloses an anchoring element for fixation in a first bone tissue and in a second bone tissue (figure 2), the first and second bone tissues being separated by non-bone tissue, the anchoring element being elongated (figure 3) and comprising an apex (see figure below) and a first fixation portion (2', figure 3) disposed at the apex, both adapted for fixation in the first bone tissue, a basis (see figure below), and a second fixation portion (3', figure 3) disposed at said basis and adapted for fixation in the second bone tissue, and an intermediate portion (see figure below) positionable in the non-bone tissue separating the first and second bone tissues, wherein the second fixation portion has a smaller basis adjacent to the intermediate portion and a larger basis forming the basis of the anchoring element (figure 3); the first

bone tissue is located in the os zygomaticum, and the second bone tissue is located in the maxilla (figure 2), and an anchoring element wherein an attachment means intended for a denture or a dental bridge is arranged at the basis of the anchoring element (page 4, lines 28-31) wherein the first fixation portion has a smaller basis adjacent to the apex and the larger basis adjacent to the intermediate portion (figure 3); the first and second fixation portions and the intermediate portion together have a smaller basis adjacent to the apex and a larger basis forming the basis of the anchoring element (figure 3); the first (5', figure 3) and second (4', figure 3) fixation portions are threaded wherein the second fixation portion comprises at least one recess (8, figure 1) transverse to the threads and disposed at the intermediate portion, comprising a distinct edge (see figure below) transverse to the threads, which edge provides a groove (see figure below) forming cutting unit (page 4, lines 16-18), and the intermediate portion has a smooth outer surface (figure 3, abstract, page 5, lines 4-7), and the outer surface of the intermediate portion, the surface limited by the valleys of the threads of the threaded first fixation portion, and the surface limited by the valleys of the threads of a threaded second fixation portion are portions of the envelope surface (figure 3). The attachment means further having an attachment hole (12, figures 1 and 3) and at least one contact surface (11, figure 1 and 3) for the denture or the dental bridge, and the attachment hole is arranged at an angle to the longitudinal axis of the dental anchoring unit (figures 1 and 3), and the end portion has a smooth outer surface (see figure below).

Branemark fails to disclose the screw forming a truncated cone shape.

Wolf discloses the use of a truncated cone shaped screw (abstract, *tapered*

profile screw) to ease insertion of the screw while providing superior fixation resulting from a progressively increasing diameter, yielding increased fixation strength while also promoting fast healing (see abstract). Accordingly it would have been obvious to one of ordinary skill in the art at the time the invention was made to have constructed the screw of Branemark to have a truncated cone shape to ease insertion of the screw while providing superior fixation resulting from a progressively increasing diameter, yielding increased fixation strength while also promoting fast healing as taught by Wolf.



Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. **See attached PTO-892.**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to MATTHEW LAWSON whose telephone number is (571)270-7375. The examiner can normally be reached on M-F, 8am-5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thomas Barrett can be reached on 571-272-4746. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/MATTHEW LAWSON/
Examiner, Art Unit 3775

/Thomas C. Barrett/
Supervisory Patent Examiner, Art
Unit 3775